CLAIMS

I claim:

1. An optical mouse integrated circuit comprising:

an unitary substrate;

an optical sensor generating data;

an analog-to-digital converter receiving and processing the data;

a microprocessor receiving the processed data; and

memory connected to the microprocessor;

wherein the optical sensor, analog-to-digital converter, microprocessor, and memory are formed on the unitary substrate.

2. An optical mouse integrated circuit, as defined in claim 1, further comprising a digital signal processor interposing the analog-to-digital converter and the microprocessor.

3. An optical mouse integrated circuit, as defined in claim 2, the digital signal processor further including a hardware controller.

4. An optical mouse integrated circuit, as defined in claim 1, further comprising a hardware controller interposing the analog-to-digital converter and the microprocessor.

5. An optical mouse integrated circuit, as defined in claim 1, the microprocessor further including an input/output controller.

6. An optical mouse integrated circuit, as defined in claim 5, further comprising a digital signal processor interposing the analog-to-digital converter and the microprocessor.

7. An optical mouse integrated circuit, as defined in claim 6, the digital signal processor further including a hardware controller.

8. An optical mouse integrated circuit, as defined in claim 1, wherein the memory is programmable memory.